

AMENDMENTS TO THE CLAIMS

1. (original) An apparatus for cooling and positioning prismatic battery cells,
comprising:

a primastic battery cell with active material in a sealed pouch;

a cooling fin made of thermally conductive material with bent tabs;

a pair of terminal tabs that reach into said pouch to draw heat away from said cell;

and

railings along length of said cell whereby said cooling fin is attached to an area of
said cell bounded by said railings by said bent tabs.

2. (original) The apparatus of claim 1 wherein said cooling fin further comprises
a flat area in direct contact with said cell; and
a corrugated area not in direct contact with said cell but in direct contact with a
coolant agent wherein heat moves from said cell to said flat area to said corrugated area to said
cooling agent.

3. (original) The apparatus of claim 2 wherein said cooling fin is made out of
copper.

4. (original) The apparatus of claim 2 wherein said cooling fin is made out of
aluminum.

5. (original) The apparatus of claim 2 wherein said cooling agent is air.

6. (original) The apparatus of claim 5 wherein said air is pumped.

7. (original) The apparatus of claim 5 wherein said air is naturally flowing.

5 8. (original) The apparatus of claim 2 wherein said cooling agent is liquid.

9. (original) The apparatus of claim 2 wherein one or more of said cooling fins are combined with one or more of said cells in an alternating geometry of fin-cell-fin-cell to form a battery module.

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10. (currently amended) The apparatus of claim 9 wherein said cooling fins are inserted among any ~~multiple~~ multiple number of cells.

11. (original) The apparatus of claim 2 wherein said cell is an Lithium-ion Polymer
15 Battery (LiPB) cell.

12. (original) The apparatus of claim 2 wherein said cell is kept in compression.

13. (original) The apparatus of claim 2 wherein said cell is held in place by said
20 cooling fin.

14. (canceled)

15. (currently amended) ~~The method of claim 14~~ A method for cooling and positioning prismatic battery cells, comprising:

sealing active material of a primastic battery cell in a pouch;

attaching a cooling fin made of thermally conductive material to said cell; and

attaching a pair of terminal tabs that reach into said pouch to draw heat away from

said cell, wherein said attaching a cooling fin further comprises:

folding railings along length of said cell;

creating bent tabs in said cooling fin to attach said cooling fin to an area of said cell bounded by said railings; and

sliding said cooling fin between said railings to fit around said area.

16. (original) The method of claim 15 wherein said cooling fin further comprises:

a flat area in direct contact with said cell; and

a corrugated area not in direct contact with said cell but in direct contact with a coolant agent whereby heat moves from said cell to said flat area to said corrugated area to said cooling agent.

17. (original) The method of claim 16 wherein said cooling fin is made out of copper.

18. (original) The method of claim 16 wherein said cooling fin is made out of aluminum.

19. (original) The method of claim 16 wherein said cooling agent is air.

20. (original) The method of claim 19 wherein said air is pumped.

21. (original) The method of claim 19 wherein said air is naturally flowing.

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22. (original) The method of claim 16 wherein said cooling agent is liquid.

23. (currently amended) The method of claim 16 wherein one or more of said cooling
fins are combined with one or more of said cells in an ~~alteranting~~ alternating geometry of fin-
10 cell-fin-cell to form a battery module.

24. (currently amended) The method of claim 23 wherein said cooling fins are
inserted among any ~~mutiple~~ multiple number of cells.

15 25. (original) The method of claim 16 wherein said cell is an Lithium-ion Polymer
Battery (LiPB) cell.

26. (original) The method of claim 16 wherein said cell is kept in compression.

20 27. (original) The method of claim 16 wherein said cell is held in place by said
cooling fin.

28. (new) An apparatus for cooling and positioning prismatic battery cells,
comprising:

a primastic battery cell with active material in a sealed pouch with a flat surface
area;

5 a cooling fin made of thermally conductive material comprising:

a flat area in direct contact with said cell, wherein said flat area covers
said flat surface area of said cell; and

a corrugated area, extending from said flat area, wherein said corrugated
area is not in direct contact with said cell but in direct contact with a coolant
10 agent.

29. (new) The apparatus of claim 28 further comprising:

a pair of terminal tabs that reach into said pouch to draw heat away from said cell.

15 30. (new) A method for cooling and positioning prismatic battery cells, comprising:
attaching a cooling fin, made of thermally conductive material, comprising of a
flat area and a corrugated area, to a primastic battery cell with active material sealed in a
pouch with a flat surface area, wherein said attaching comprises:

attaching said flat area of said cooling fin to said flat surface area of said cell,

20 whereby said flat area of cooling fin comes in direct contact with said cell; and

positioning said corrugated area not in direct contact with said cell but in direct
contact with a coolant agent.

31. (new) The method of claim 30 wherein said cooling fin further comprises:
attaching a pair of terminal tabs that reach into said pouch to draw heat away from
said cell.